

PCT

WORLD INTELLECTUAL PROPERTY ORGANIZATION  
International Bureau



INTERNATIONAL APPLICATION PUBLISHED UNDER THE PATENT COOPERATION TREATY (PCT)

(51) International Patent Classification <sup>6</sup> : <b>H04L 29/06, 12/58</b>		A1	(11) International Publication Number: <b>WO 96/24213</b> (43) International Publication Date: <b>8 August 1996 (08.08.96)</b>
<p>(21) International Application Number: <b>PCT/US96/00933</b></p> <p>(22) International Filing Date: <b>24 January 1996 (24.01.96)</b></p> <p>(30) Priority Data: <b>08/382,118</b> <b>1 February 1995 (01.02.95)</b> <b>US</b></p> <p>(71) Applicant: <b>FREEMARK COMMUNICATIONS, INC.</b> <b>(US/US); 125 Cambridge Park Drive, Cambridge, MA</b> <b>02140 (US).</b></p> <p>(72) Inventors: <b>GOLDSCHMITT, Marv</b>; <b>7 Corcoran Road, Burlington, MA 01803 (US).</b> <b>YOUNG, Robert, A.</b>; <b>36 Peabody Road, Arlington, MA 02174 (US).</b></p> <p>(74) Agent: <b>LONGO, Robin, R.; Testa, Hurwitz &amp; Thibeault, High Street Tower, 125 High Street, Boston, MA 02110 (US).</b></p>		<p>(81) Designated States: <b>AM, AU, AZ, BB, BG, BR, BY, CA, CN, CZ, EE, FI, GE, HU, IS, JP, KG, KP, KR, KZ, LK, LR, LT, LV, MD, MG, MK, MN, MX, NO, NZ, PL, RO, RU, SG, SI, SK, TJ, TM, TR, TT, UA, UZ, VN, ARIPO patent (KE, LS, MW, SD, SZ, UG), European patent (AT, BE, CH, DE, DK, ES, FR, GB, GR, IE, IT, LU, MC, NL, PT, SE), OAPI patent (BF, BJ, CF, CG, CI, CM, GA, GN, ML, MR, NE, SN, TD, TG).</b></p> <p><b>Published</b> <i>With international search report.</i> <i>Before the expiration of the time limit for amending the claims and to be republished in the event of the receipt of amendments.</i></p>	
<p>(54) Title: <b>SYSTEM AND METHOD FOR PROVIDING END-USER FREE EMAIL</b></p> <p>(57) Abstract</p> <p>The invention provides members of an interconnected e-mail system - e.g., those reachable through the internet or via an on-line service - with free email. The email cost is absorbed by advertising sponsorship to advertise certain products to subscribers. An email message sent through a subscriber communications network includes at least two visible portions: a first portion includes information that is to be communicated from the message originator, privately and unmodified, to the receiver of the email; and a second portion includes information about the sponsor supplied advertising, e.g., a graphical image of the advertiser's logo or a time sensitive promotion. Other portions of the email message, in accord with the invention, can include commands and options that are selectable by the user, and can further include logo, artwork and/or information about a particular subscriber communication network - e.g., ProductView Interactive™.</p>			

**FOR THE PURPOSES OF INFORMATION ONLY**

Codes used to identify States party to the PCT on the front pages of pamphlets publishing international applications under the PCT.

AM	Armenia	GB	United Kingdom	MW	Malawi
AT	Austria	GE	Georgia	MX	Mexico
AU	Australia	GN	Guinea	NE	Niger
BB	Barbados	GR	Greece	NL	Netherlands
BE	Belgium	HU	Hungary	NO	Norway
BF	Burkina Faso	IE	Ireland	NZ	New Zealand
BG	Bulgaria	IT	Italy	PL	Poland
BJ	Benin	JP	Japan	PT	Portugal
BR	Brazil	KE	Kenya	RO	Romania
BY	Belarus	KG	Kyrgyzstan	RU	Russian Federation
CA	Canada	KP	Democratic People's Republic of Korea	SD	Sudan
CF	Central African Republic	KR	Republic of Korea	SE	Sweden
CG	Congo	KZ	Kazakhstan	SG	Singapore
CH	Switzerland	LI	Liechtenstein	SI	Slovenia
CI	Côte d'Ivoire	LK	Sri Lanka	SK	Slovakia
CM	Cameroon	LR	Liberia	SN	Senegal
CN	China	LT	Lithuania	SZ	Swaziland
CS	Czechoslovakia	LU	Luxembourg	TD	Chad
CZ	Czech Republic	LV	Latvia	TG	Togo
DE	Germany	MC	Monaco	TJ	Tajikistan
DK	Denmark	MD	Republic of Moldova	TT	Trinidad and Tobago
EE	Estonia	MG	Madagascar	UA	Ukraine
ES	Spain	ML	Mali	UG	Uganda
FI	Finland	MN	Mongolia	US	United States of America
FR	France	MR	Mauritania	UZ	Uzbekistan
GA	Gabon			VN	Viet Nam

## System and Method for Providing End-User Free Email

### Background of the Invention

Email is known and commonly used. Email is available, for example, to users that are connected to a common computer network, e.g., Novell™, so that they can designate and send selected messages, including attached application and graphics files, to other users on the network. This type of network is generally

- 5 licensed to a particular company to service employees at that company; and email messages between employees are provided as part of the fee for that license. The company can also have access to the internet by purchasing an internet node and communicating to external internet addresses through the network. However, email messages to internet addresses, and to parties external to the company's
- 10 network, are charged to the company.

Email is also available to the many subscribers of on-line services such as ProductView Interactive™, Compuserve™, America On-Line™, and Prodigy™. A user of such an on-line service typically pays a monthly fee to have access to information and services - including email - from the home, workplace, or

- 15 practically any location with a computer, modem and active phone line. Typically, a user opens up the email application as part of the service and designates one or more receiving parties. The user also types in information that the receiving parties are to receive, and/or attaches or appends one or more files from another application, and sends the information and/or files to the designated receiving
- 20 parties.

Email services on such on-line services are not, however, free. For example, a Compuserve™ subscriber pays a fee (typically fifteen cents to several dollars, depending on the length of the file or message being sent) to send an email message to other Compuserve™ subscribers, as well as to users subscribing to

- 2 -

other on-line services (e.g., ProductView Interactive™, America On-Line™ and Prodigy™) and to internet addresses.

In summary, any user of an on-line service or internet subscribing service can generally send email to other users with an internet address. However, the 5 cost of this email is charged to the sender (and/or in some cases the receiver).

It is, accordingly, an object of the invention to provide systems and methods for providing free email service, such as to subscribers of on-line services and the internet.

It is yet another object of the invention to provide a system which reduces 10 the cost of email to end-users, such as to subscribers of on-line services and the internet.

Still another object of the invention is to provide a method for charging email costs to advertisers on an information network such as the internet.

These and other objects will be apparent in the specification which follows.

15 **Summary of the Invention**

As used herein, "email," "e-mail," "electronic message," "email messages" and "electronic mail" means an electronic messaging service wherein a plurality of terminals and/or computers are connected by a communication network and arranged to send and receive electronic messages to other terminals and/or

20 computers on the communications network. Thus, as also used herein, "communication network" includes subscriber on-line services such as ProductView Interactive™, Compuserve™, America On-Line™, and Prodigy™; and further includes a subscriber service to the internet, which provides email services to users from a variety of information providers and sources. The internet 25 is also accessible through on-line services; and also through designated internet nodes, which is commonly established at companies that wish to communicate with users of the interenet. Also, in accord with the invention, "email" can include

- 3 -

that messaging which occurs on ITV, cable systems, satellite transmissions, wireless communications (other than cellular), and like transmissions.

Briefly, the invention provides members of an interconnected e-mail system - e.g., those reachable through the internet or via an on-line service - with 5 free email. The email cost is absorbed by advertising sponsorship to advertise certain products to subscribers and users of the internet. Preferably, the creation and reading of email, according to the invention, occurs off-line, to reduce costs to the advertisers. Active connection to the communication network thus preferably occurs only for the purpose of uploading and downloading email 10 messages. In general, though, the invention provides free email messaging to all subscribers who agree to receive and/or send sponsored email. Unsponsored outgoing email, created by the subscriber, is also free regardless of length of message, content, addressee, message volume (size), and time of creation.

15 The invention also provides other capabilities associated with the free email, including: hierarchical folders for filing efficiency, forwarding to other email users, prioritization of email messages, attachments to email messages, and address books for addressing of other email users.

20 In accord with one aspect of the invention, an email message is received through a subscriber communications network from any email source. This message contains private information for the addressee of the sender. The contents of the message remain private, unread, and unmodified. The message goes 25 through three distinct steps prior to final delivery to the addressee:

1. The message is stored on the service's mail server until requested by the addressee;
- 25 2. Upon request by the addressee, an advertisement is selected and appended to the mail message after a special delimiter; and
3. The message and the appended advertisement, along with the attendant files and graphics, are transmitted to the addressee for viewing.

- 4 -

The part appended to the email message includes information about the sponsor supplied advertising, e.g., a graphical image of the advertiser's logo. The information appended to the email message, in accord with the invention, can include commands and options that are selectable by the user, and can further 5 include logo, artwork and/or information about a particular subscriber communication network - e.g., ProductView Interactive™.

In still another aspect of the invention, the appended information which includes information about the sponsor supplied advertising is automatically attached to certain email messages. Further, such automatic attachment can be 10 accomplished on a statistical basis - described in more detail below - and/or on a temporal basis. Therefore, if, for example, one advertiser wishes to display certain information to a selected 25% of email messages transmitted over a communications network, the invention accordingly determines the corresponding statistical user base and attaches that advertiser's information to email messages 15 on that basis. The invention also provides features whereby an advertiser can append advertising information at a particular time of the day: for example, an advertiser can select at which time of day certain advertising information will be attached to email on the network.

Such features are especially advantageous because advertising by nature is 20 extremely temporal. That is, advertisers want to know, typically, when their target market will view their advertisement. Often, in fact, the time of viewing itself defines the nature of the target market. Thus, in accord with the invention, email messages can be appended with advertising information that is dependent, at least in part, with the time period of the day when the message is retrieved. This time- 25 dependent advertising is sometime denoted herein as "dayparts."

Since composition of new email messages will occur off-line at unpredictable times, such time sensitive advertising can be difficult to achieve with precision (this is due to fact that advertisements may be resident on the user's computer during off-line email creation and receipt). Thus, in accord with one

- 5 -

aspect of the invention, advertisements are appended to incoming email as the email is downloaded from the respective server. The advertisement will then be presented to the user at the time the message is accessed and read.

Thus, in another aspect of the invention, the attachment of a message

5 occurs only when the receiving user initiates the process of retrieving email messages from the network. For example, certain users of subscriber communication networks access their computer in the evening when they return home from work. During the day, email messages are stored in a buffer on the respective subscriber service - e.g., Compuserve™ - and transmitted to the user

10 when selected at the user's home terminal. It is at that point, in accord with the invention, that the advertisement will be appended to the message, making that message transmission free to the user. In addition, that appended advertisement can correspond to the access time of the user. That is, the actual advertisement that is received at the user's terminal can be one of those advertisements which is

15 sent only in the evening. By way of example, a liquor manufacturer might prefer that liquor advertisements be transmitted to adults only in the evening, and not in the morning. Likewise, coffee manufacturers might prefer advertising in the morning, to encourage activity normally associated with that time of day. The invention provides this type of advertisement time discrimination.

20 In another aspect of the invention, one or more subscriber communication networks pay all the email costs of users connected to the network, and thereafter charge advertisers to append advertisements to the messages. In this manner, the email is still free to the end-user; but the immediate cost is borne by the particular network and later charged to the specific advertiser. In this manner, the advertiser

25 benefits by paying only when and if a specific advertisement has, in fact, been delivered to a specific recipient.

In still other aspects of the invention, there are other ways to "sell" advertisers advertising space on email messages. In addition to dayparts, where email messages are appended with advertiser-specific information that is

- 6 -

dependent on a particular period of time in the day, other methods of charging advertisers exist, including: (1) "profile match," which provides a means of charging an advertiser wherein advertisements are appended to email messages to a particular number of email users that match a preselected demographic criteria; 5 and (2) "run of schedule" (ROS), which provides a means of charging an advertiser wherein advertisements will be appended to email messages for a certain number of times during the day, without a specific time period specified. With further reference to the dayparts methods described above, and by way of example, an advertiser such as Coke™ may select a Coke™ advertisement to be 10 transmitted up to 1000 times as appendages to email messages between the hours of 5PM and 7PM.

The advertisement does not depend, in any way, on the content of the email message, the originator of the message, the routing of the message, or the format and display of the message. However, as described above, the criteria by 15 which an advertisement can be selected for attachment to a given email message can include: (i) dayparts, specifying, for example, the time of day when the message is received; (ii) ROS, for scheduled inclusion of advertisements; and (iii) profile match, to specify an advertisement appendage to an email message based upon some demographic quantity, e.g., age or preferences of the receiver.

20 The invention is next described further in connection with preferred embodiments, and it will be apparent that various additions, subtractions, and modifications can be made by those skilled in the art without departing from the scope of the invention.

#### Brief Description of the Illustrated Embodiments

25 A more complete understanding of the invention may be obtained by reference to the drawings, in which:

Figure 1 shows a system, constructed according to the invention, for providing free email messaging to end users;

- 7 -

Figure 2 shows a storage unit constructed according to the invention for storing ad-specific information and mode information about transmission guidelines;

Figure 3A shows a representative display of an email message, in accord 5 with the invention, and which includes advertisement specific information as part of the displayed information; Figure 3B shows additional information about an advertisement that is selectable on the screen by a user;

Figures 3C shows another representative display of an email message, in accord with the invention, and which includes advertisement specific information 10 for viewing and selection by the email receiver; and Figures 3D-3E illustrate that additional, hierarchical detail about the displayed advertisement is available to the user by selecting the advertisement on the screen;

Figure 4 illustrates the routing of selected email messages between mail senders and mail receivers, in accord with the invention;

15 Figure 5 illustrates one preferred embodiment of the invention wherein users are notified that unread email messages exist by displaying advertisement information on the notification;

Figure 6 illustrates further features of the invention, including other information services that are selectable by the user;

20 Figure 7 shows one flow chart of processing email, in accord with the invention; and

Figure 8 illustrates another embodiment of the invention including block diagrams.

#### Detailed Description

25 Figure 1 shows a system 10 illustrating certain features of the invention whereby advertiser information is appended to email messages as it is "picked up"

- 8 -

by the receiving user. End users 12, 14 and 16 illustrate typical end-users (shown for illustrative purposes as computer terminals) that are connected, via communication links 17, to a central email messaging center 18. By way of one example, the users 12, 14 and 16 can be subscribers on an on-line service (e.g., 5 Compuserve™) that is managed and controlled at the center 18. By way of another example, each end user 12, 14 and 16 can have internet addresses; and the center 18 is providing on-line services to member 20, who is also an end user for mail messaging purposes. In Figure 1, each user 12, 14, 16 and 20 can send messages to one another at any time. The messages are routed to the center 18 and stored in email buffer 22 until accessed by the user receiving the email. Once 10 the receiving user accesses her mail, an advertisement is appended to the message stored in the buffer 22 and transmitted to the user along the appropriate transmission line 17.

The advertisements to be appended to the messages are stored in 15 advertiser storage 24, e.g., data files. The information for each advertisement in the storage 24 contains mode information which is discernible by the center 18. The mode information can include, without limitation, one or more of the following: (i) dayparts information specifying the period of day for which the advertisement is to be appended to email messages, (ii) ROS information 20 identifying the regular schedule for appending advertisements; and (iii) profile match information identifying certain demographic information, such as age or preferences of the receiver. Specifically, the center 18 includes a mode filter 26 to filter which advertisement can be attached to a given email message prior to transmission. The mode filter 26, for example, prevents dayparts messages 25 specifying day-only delivery from being transmitted to users at nighttime.

By way of example, assume user 12 and 20 exist on a common subscriber service, e.g., ProductView Interactive™. In this example, user 12 can send a message to user 20 via the communication lines 17 (e.g., telephone lines, satellite links, fiber optic cabling and other existing telecommunications infrastructure) and

- 9 -

through the center 18. The email buffer 22 stores the message until accessed by the user 20. When the user 20 accesses his computer terminal, the center 18 first lets the user know that a message awaits retrieval from the center 18. When the user commands to read the stored mail, the center 18 appends an advertisement, if any, to the message and transmits the message to the user. At the user 20 terminal, the email message appears in one portion of the screen, and the advertisement appears in a second screen portion.

Mode filter 26 also determines the frequency for which the advertisements within the storage 24 are to be appended to email messages. For example, if an 10 advertisement selects a 50% frequency table (provided in the mode information), the mode filter assures that only 50% of the messages are appended with that advertisement.

The format of the advertisement within the storage 24 is illustratively shown in Figure 2. Each advertisement takes a block of storage 28 which includes 15 storage units 28a, 28b to store, respectively, information about the advertisement and about the mode for transmission. For example, the unit 28a can store a graphical depiction of the advertisement; while the unit 28b can store information that instructs the center 18 to send that advertisement only in the evening and at a frequency of 30%. Additional blocks 28' can include additional advertisers and 20 mode information. The mode information of units 28b is not transmitted by the center 18; but rather is used by the center to distribute those messages correctly, as chosen by the advertiser.

When the end user receives mail, in accord with the invention, advertisement specific information and references (e.g., files and graphics) are 25 appended to each message as the message is picked up, thereby paying for the email messaging for the end-user. Figure 3A, shows one message generated according to the invention that includes a message portion 30 and advertisement portion 32. A visual delineator 34 separates the advertisement oriented data 32 from the message text 30. The original message 30 remains unchanged upon

- 10 -

delivery to the receiving use; but the graphics portion 32 is appended to the text 30 and displayed to the receiving user. A user can thereafter select the advertisement 32 to obtain further information, such as shown in Figure 3B, which shows a larger, more detailed display of the advertisement information of portion 5 32.

Figures 3C-3E show another example of presenting advertisement information in an interactive manner, in accord with the invention. Specifically, Figure 3C includes a message portion 30', ad portion 32', and a delineator 34'. When a user selects the ad portion 32', further detail of the advertisement is 10 displayed to the user. When the user again selects the interactive brochure portion 35, more detailed information is made available to the user, such as shown in Figure 3E.

Figure 4 depicts one illustrative embodiment of the invention that shows routing of email messages from mail originators 36, through the messaging center 15 38 (e.g., similar to the center 18, Figure 1), and to the mail receivers 40. The mail users 36 are illustratively shown as originating from three separate points: on-line service ProductView Interactive™ 36a, on-line service Compuserve™ 36b, and the Internet 36c. The center 38 is illustratively shown as the central processing system of the on-line service corresponding to the ProductView Interactive™ 20 subscriber 36a. The mail receivers 40a and 40b are referred to illustratively as Jim and Tom, who, respectively, receive messages at their respective personal computers (PC).

Thus, with further reference to Figure 4, messages come into the center 38 from a variety of sources, including the internet and on-line services such as 25 Compuserve™ 36b; and are stored in the mail server 38a (e.g., similar to the email buffer 22, Figure 1). As described herein, advertisements are appended to selected mail messages before retransmission to the end user, e.g., to Jim 40a and Tom 40b. The advertisement can include, for example, graphics detail of the

- 11 -

advertiser paying for the advertisement (and thus the message), or textual information about the advertiser.

In one preferred embodiment, the invention notifies users of the system that he/she has email awaiting retrieval via an advertisement displayed on the 5 screen, such as shown in Figure 5. More particularly, when a user accesses the appropriate subscriber network, e.g., ProductView Interactive™, the user is first notified of messages awaiting retrieval, shown illustratively as messages 50a-50e. In this manner, the notification that messages are waiting includes the advertiser information, paying for that particular email.

10 Figure 6 illustrates another example of email that is awaiting retrieval by a user of the invention when using a subscriber network.

Figure 7 shows one embodiment of the invention including a flow chart of one processing scheme. The first step 70 in the processing scheme is that of obtaining electronic mail from one or more system end-users. The system then 15 asks, at step 71, if there is any user-specific information available for later use in determining which advertisement label should be attached to the electronic mail. User-specific information can range from information regarding the telephone service that the user is operating on, to consumer preferences, to demographic information such as the location from which the user is calling. These examples 20 are intended to be illustrative only, as the system could further utilize additional information. If user-specific information is available, it is stored at step 72 and then the electronic mail is stored in step 73. If there is no user-specific data, the processing scheme drops down to step 73 and stores electronic mail. Generally, no more activity is undertaken until the user requests his or her mail. However, 25 once requested, and after the electronic mail and the user-specific data have been stored, the processing scheme determines (step 74) the conditions that are present. This step is important as the user-specific data and general environmental data, such as the time of day, the end of an interval, etcetera, are user-specific and system environment conditions that will aid in the determination as to what

- 12 -

advertisement label should be attached to the electronic mail. To determine the existence of such conditions, in step 75, the processing scheme scans the storage module containing user-specific and miscellaneous environmental data, and obtains any information available therefrom. This condition-data is then compared

5       in step 76 with conditions or modes requisite for advertisement selection, each stored advertisements having a condition or mode associated therewith. The conditions associated with the stored advertisement data can fall within any of the following non-limiting categories: profile, run of schedule, and dayparts. The profile condition refers to an advertisement that requires certain demographic data

10      to be present. The run of schedule condition refers to an advertisement which is to be run a certain number of times during a day or other period of time. The daypart condition refers to an advertisement which is to be run for a certain percentage of time during a specific time period. In step 76, such conditions are compared to user-specific storage and other miscellaneous data indicative

15      preferably of system environmental conditions (eg. time of day, detection of an interval of time elapsing) to determine the existence of a match between conditions. After determining the existence of a match, the advertisement data corresponding to the condition matched, is retrieved from storage. The processing scheme (step 78) then retrieves the electronic mail stored in storage.

20      In step 79, a composite electronic mail signal is generated, by attaching the advertisement data to the electronic mail and separating the two with a delineator to avoid interference with the integrity of the message. The composite electronic mail signal is later transmitted in step 80 to an intended receiver.

Figure 8 shows further detail of one embodiment of the invention in block

25      diagram format. The system 100 comprises a server module 112 and an attaching module 114. Computer processors 120 and 122 are responsible for performing the processing scheme of the invention, as described in Figure 7. The server module 112 receives electronic mail and other user-specific data from a plurality of electronic mail users 130. The server module stores electronic mail and the

30      user-specific data in respective storage locations 116, 118. Privacy as to message

- 13 -

content is maintained in both the server module 112 and the attaching module 114, as the message is merely stored in storage 116 and later used to generate composite electronic mail by attachment with a label. Storage 118 is used to store information relating to the user, such as the user's telephone carrier, consumer preferences and demographic data, as well as miscellaneous system environmental data as described in Figure 7. This information can be used to select the label that will be used to generate the composite electronic mail signal.

After storing the electronic mail and the user-specific information, the server module communicates with the attaching module 114 to determine which of the labels stored in storage 124 should be combined with the electronic mail stored in storage 116. The labels are preferably advertisements sold to various advertisers who pay the fees for transmission of the electronic mail message to the intended recipient. The invention, however, is not to be limited to such a use, as the labels could be used for other commercial as well as non-commercial uses.

The system 110 has the ability to store numerous labels containing advertisements. Given the large number of advertisements from which the processor 122 must select, a determination is made as to which of the stored labels are to be attached to the stored electronic mail. Such determinations are made by assigning a condition to each of the advertisement data, and subsequently examining whether the condition is satisfied. Such conditions are discussed, for example, in connection with Figure 7. Conditions associated with each of the labels are also stored in storage 126. The processor reviews the existing conditions, such as time of day, lapse of an interval, or receipt of user-specific data associated with the electronic mail in question. The processor 122 also reviews the conditions assigned to each of the stored advertisements. If there is a match, that is depending on whether a condition requisite for label attachment is satisfied, the processor 122 of the attaching module 114 will selectively access that specific advertisement label for attachment with the electronic mail message in question.

- 14 -

Once the processor has determined which advertisement label is to be attached (or appended) to an electronic mail message, the composite electronic mail dispatcher 128, attaches the advertisement label to the electronic mail without interfering with the integrity of the message data contained within the electronic  
5 mail. Attachment is carried out through the use of a delineator which is used to separate the advertisement label from the message data, thus generating composite electronic mail. The original message content remains unaltered, and the composite electronic mail signal is transmitted to the intended receiver, also an electronic mail user 130. Transmission may occur upon receipt of a request from  
10 the intended receiver.

Appendix A contains, for disclosure purposes, subject matter setting forth a non-limiting functional specification which is suitable for application with the invention. Appendix A is herein incorporated by reference.

The invention thus attains the objects set forth above, in addition to those  
15 apparent from the preceding description. Since certain changes may be made in the apparatus and methods described herein without departing from the scope of the invention, it is intended that all matter contained in the above description or shown in the accompanying drawing be interpreted as illustrative and not in a limiting sense.

20 It is also understood that the following claims cover all the specific and generic features of the invention described herein, and all statements of the scope of the invention which, as a matter of language, might be said to fall there between.

What is claimed is:

- 15 -

- 1 1. In a system for delivering email, the system of the type comprising a  
2 plurality of users connected to send and receive email messages, the improvement  
3 comprising:
  - 4 (A) storage means for storing advertising information, the advertising  
5 information including (i) ad information representing detail about a specific  
6 product or service and (ii) mode information representing guidelines for delivering  
7 the advertising information to users of the system;
  - 8 (B) means responsive to the mode information for appending the advertising  
9 information to one or more email messages; and
  - 10 (C) means for communicating the advertising information to a user of the  
11 system while simultaneously communicating the one or more email messages to  
12 the user.
- 1 2. In a system according to claim 1, the further improvement wherein the  
2 mode information comprises dayparts information for specifying a period of time  
3 within a day to append the ad information.
- 1 3. In a system according to claim 1, the further improvement wherein the  
2 mode information comprises profile match information for specifying a  
3 demographic profile of receivers of the one or more email messages.
- 1 4. In a system according to claim 1, the further improvement wherein the  
2 mode information comprises run of schedule information for specifying a time  
3 schedule of the delivering ad information to the one or more email messages.
- 1 5. In a system according to claim 1, the further improvement comprising a  
2 mode filter for filtering and routing email messages to selected users of the system  
3 according to the mode information.

- 16 -

- 1        6.     A system for displaying email messages to a user, the system of the type
- 2     having a plurality of users connected on a communications network to transmit
- 3     and receive email, comprising:
- 4        (A)    advertisement storage means for storing advertising information including
- 5        (i) ad information representing detail about a specific product or service and (ii)
- 6        mode information representing guidelines for delivering the advertising
- 7        information to users of the system;
- 8        (B)    email buffer means for storing email, each email identifying one or more
- 9        users to receive the email;
- 10      (C)    means responsive to the one or more users on the network for sending
- 11      notification to the one or more users that email is stored in the buffer; and
- 12      (D)    means for appending the advertising information to the notification and for
- 13      displaying the advertising information and the notification to the one or more
- 14      users.
- 1        7.     A method for providing free email services on a system of the type having
- 2     a plurality of users connected on a communications network to transmit and
- 3     receive email, comprising the steps of:
- 4        (A)    storing advertising information on a storage medium;
- 5        (B)    storing the email in an email buffer;
- 6        (C)    appending the advertising information to the email and communicating the
- 7        combined email and advertising information to the user.
- 1        8.     A system for attaching a label to electronic mail comprising:
- 2        a server module comprising means for receiving and storing electronic mail
- 3        from at least one creator of electronic mail; and
- 4        an attaching module comprising:

- 17 -

5           means for storing a plurality of labels and designating conditions required  
6    for accessing each of said labels;  
7           means for detecting said conditions required and selectively accessing said  
8    labels which correspond to said conditions;  
9           means for attaching said labels to said electronic mail to create composite  
10    electronic mail;  
11           means for providing a visible display of said composite electronic mail to a  
12    mail receiver.

1   9.       The system for attaching a label to electronic mail according to claim 8,  
2    said label further comprising advertisement data.

1   10.      The system for attaching a label to electronic mail according to claim 8,  
2    said means for providing a visible display further comprising means for enabling a  
3    user to view message and advertisement data contained in said composite  
4    electronic mail.

1   11.      The system for attaching a label to electronic mail according to claim 8,  
2    said at least one mail originator comprising a computer communicating with an  
3    on-line service.

1   12.      The system for attaching a label to electronic mail according to claim 11,  
2    wherein the computer comprises one of a personal computer, a facsimile machine,  
3    a telephone, a television, an internal processor within the on-line service, or a  
4    multi-media system.

1   13.      The system for attaching a label to electronic mail according to claim 8,  
2    whereby said composite electronic mail is transmitted upon request by said mail  
3    receiver.

1   14.      The system for attaching a label to electronic mail according to claim 8,  
2    whereby said composite electronic mail is transmitted automatically to the mail  
3    receiver.

- 18 -

- 1 15. The system for attaching a label to electronic mail according to claim 8,  
2 whereby a condition for accessing a label is the time of day.
- 1 16. The system for attaching a label to electronic mail according to claim 8,  
2 whereby a condition for accessing a label is the passage of a time interval.
- 1 17. The system for attaching a label to electronic mail according to claim 8,  
2 whereby a condition for accessing a label is the receipt of user-specific data from  
3 the mail originator.
- 1 18. The system for attaching a label to electronic mail according to claim 8,  
2 whereby a condition for accessing a label is the access of user-specific data about  
3 the receiver.
- 1 19. The system for attaching a label to electronic mail according to claim 17  
2 whereby said user-specific data comprises consumer purchase data.
- 1 20. The system for attaching a label to electronic mail according to claim 17  
2 whereby said user-specific data comprises demographic data.
- 1 21. The system for attaching a label to electronic mail according to claim 8,  
2 further comprising means for assessing a transmission charge to an advertiser  
3 associated with said advertisement data, for the cost of providing said display to  
4 the mail receiver.
- 1 22. A method for creating and distributing composite electronic mail  
2 comprising:
  - 3 providing a system in communication with users of electronic mail;
  - 4 storing a plurality of labels in the system;
  - 5 designating conditions for accessing and attaching each of said labels with  
6 electronic mail transmitted to the system;
  - 7 receiving electronic mail from at least one user;
  - 8 determining the existence of conditions for accessing said labels;

- 19 -

9           selectively accessing said labels which correspond to the conditions  
10    determined;  
11           attaching said accessed labels to said electronic mail to create composite  
12    electronic mail;  
13           transmitting said composite electronic mail to a mail receiver;  
14           providing a visible display of said composite electronic mail to a mail  
15    receiver.

1   23.   The method according to claim 22, said label comprising advertisement  
2    data specific to advertisers.

1   24.   The method according to claim 23, said transmitting step further  
2    comprising, assessing a transmission charge to an advertiser whose advertisement  
3    data appears on the label in the composite electronic mail.

1   25.   The method according to claim 22, said step of attaching said accessed  
2    labels further comprising using a delimiter to separate the label from a message  
3    contained in the electronic mail sent by the at least one user.

1   26.   The method according to claim 22, said step of providing a visible display  
2    further comprising providing the mail receiver with a display of a message and  
3    advertisement data.

1   27.   A system for utilizing electronic mail free of charge, comprising:  
2           at least one mail originator comprising:  
3           means for creating electronic mail;  
4           means for transmitting electronic mail; and  
5           a mail interceptor comprising:  
6           a server module having means for receiving and storing electronic mail  
7    from at least one mail originator;  
8           an attaching module comprising:  
9           means for storing a plurality of labels containing advertisement data and  
10    designating conditions required for accessing each of said labels;

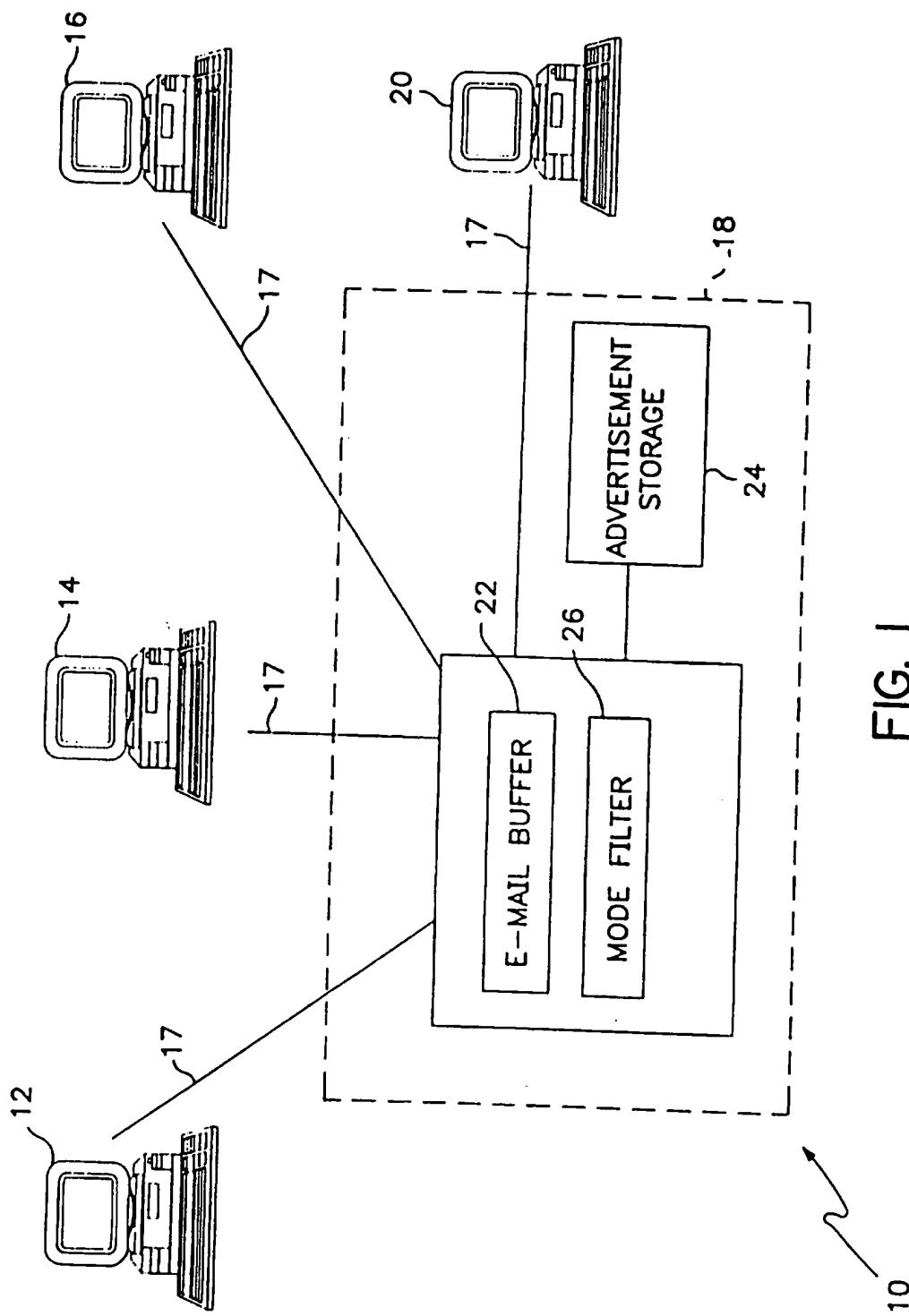
- 20 -

- 11        means for detecting said conditions required and selectively accessing said
- 12        labels which correspond to said conditions;
- 13        means for attaching said labels to said electronic mail to create composite
- 14        electronic mail;
- 15        means for transmitting said composite electronic mail to at least one mail
- 16        receiver designated by said at least one mail originator;
- 17        at least one receiver of electronic mail comprising:
- 18        means for displaying said composite electronic mail.

- 1        28.      The system for utilizing electronic mail free of charge according to claim
- 2        27, said mail interceptor further comprising means for assessing a transmission
- 3        charge to the advertiser associated with said advertisement data.

- 1        29.      The system for utilizing electronic mail free of charge according to claim
- 2        27, said composite electronic mail comprising a message file, an advertisement
- 3        label and a delimiter positioned therebetween.

- 1        30.     The system of claim 27, wherein the system is a subscriber service, and
- 2        further comprising means responsive to each user for accepting or declining
- 3        sponsored email, the email being free for both outgoing mail and incoming mail to
- 4        the users.



SUBSTITUTE SHEET (RULE 26)

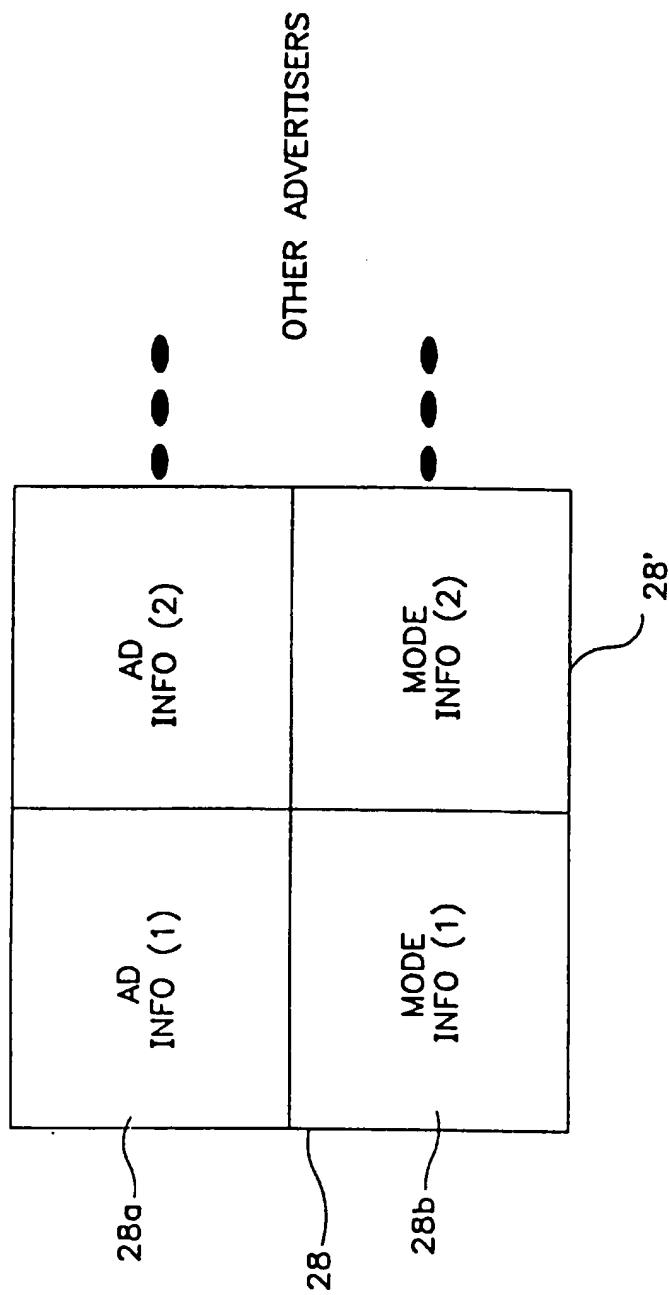


FIG. 2

**SUBSTITUTE SHEET (RULE 26)**

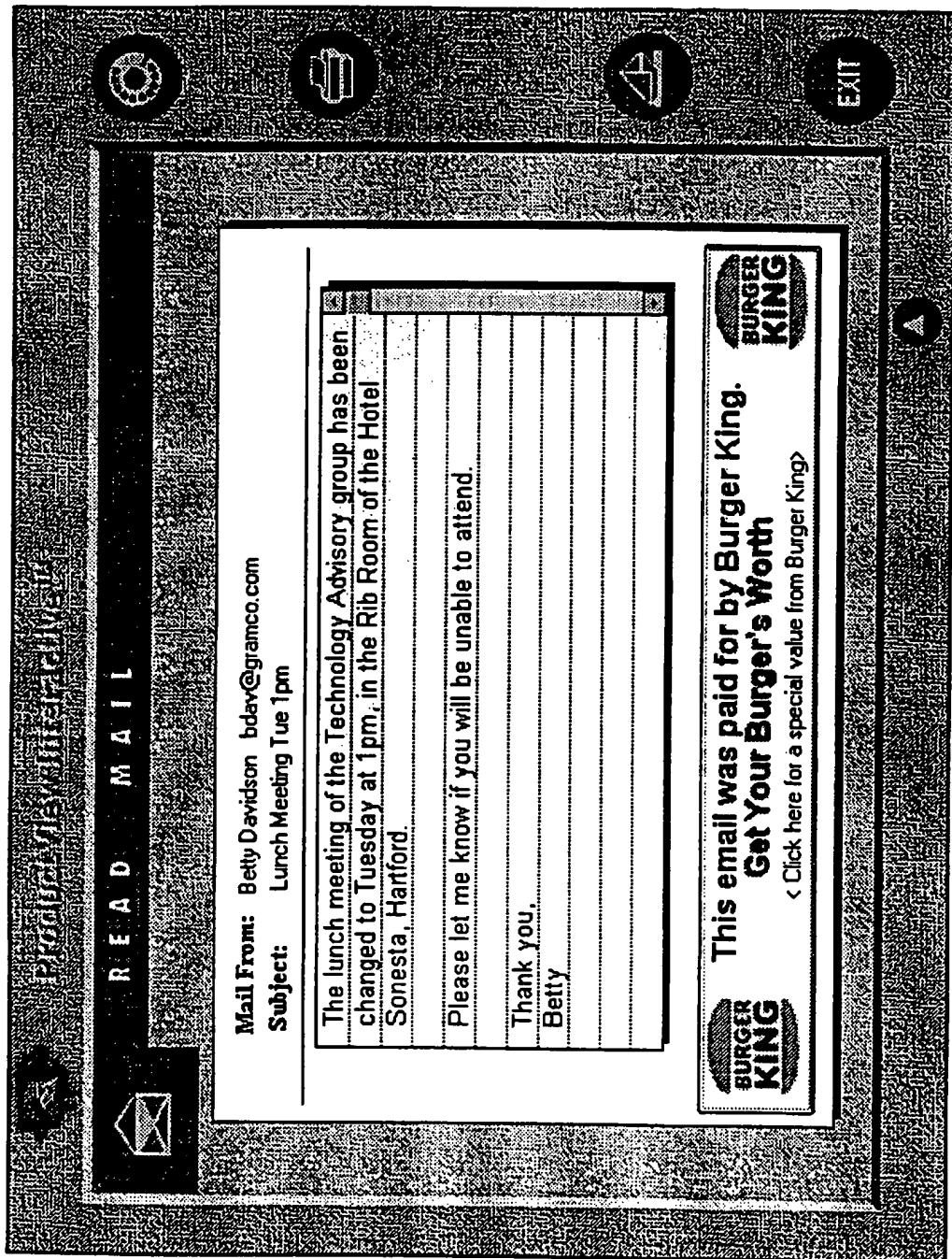


FIG. 3A

SUBSTITUTE SHEET (RULE 26)

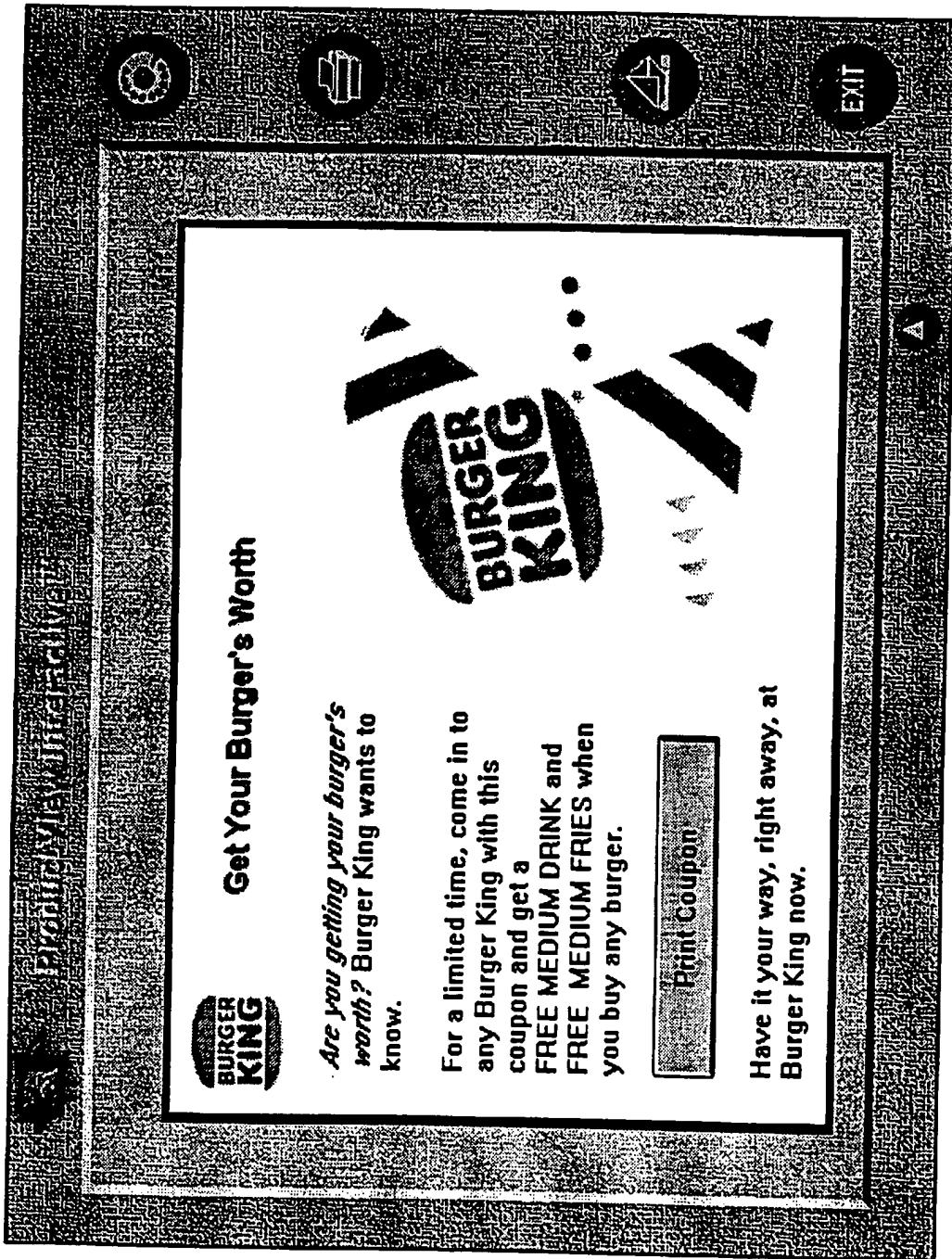


FIG. 3B

SUBSTITUTE SHEET (RULE 26)

5/12

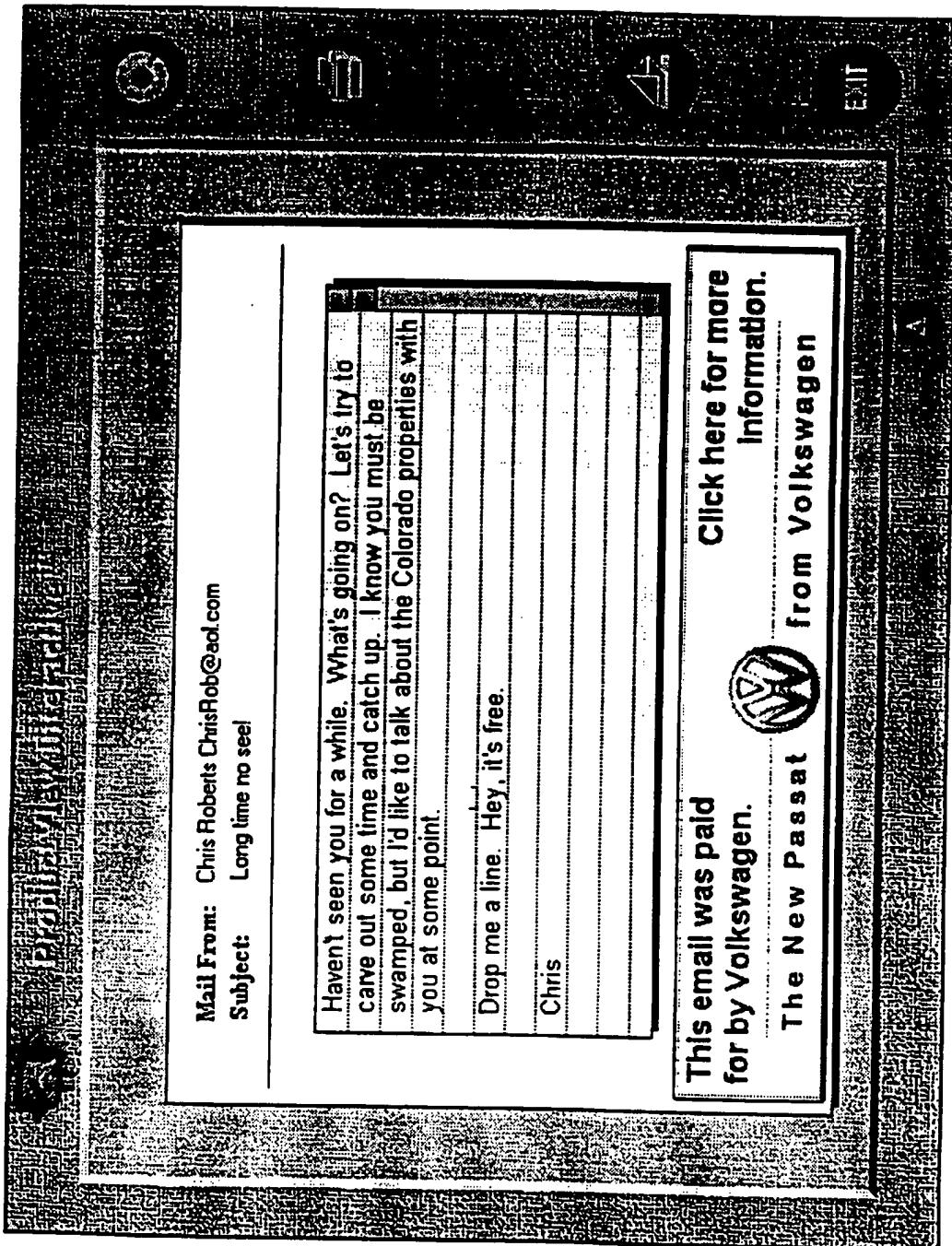


FIG. 3C

SUBSTITUTE SHEET (RULE 26)

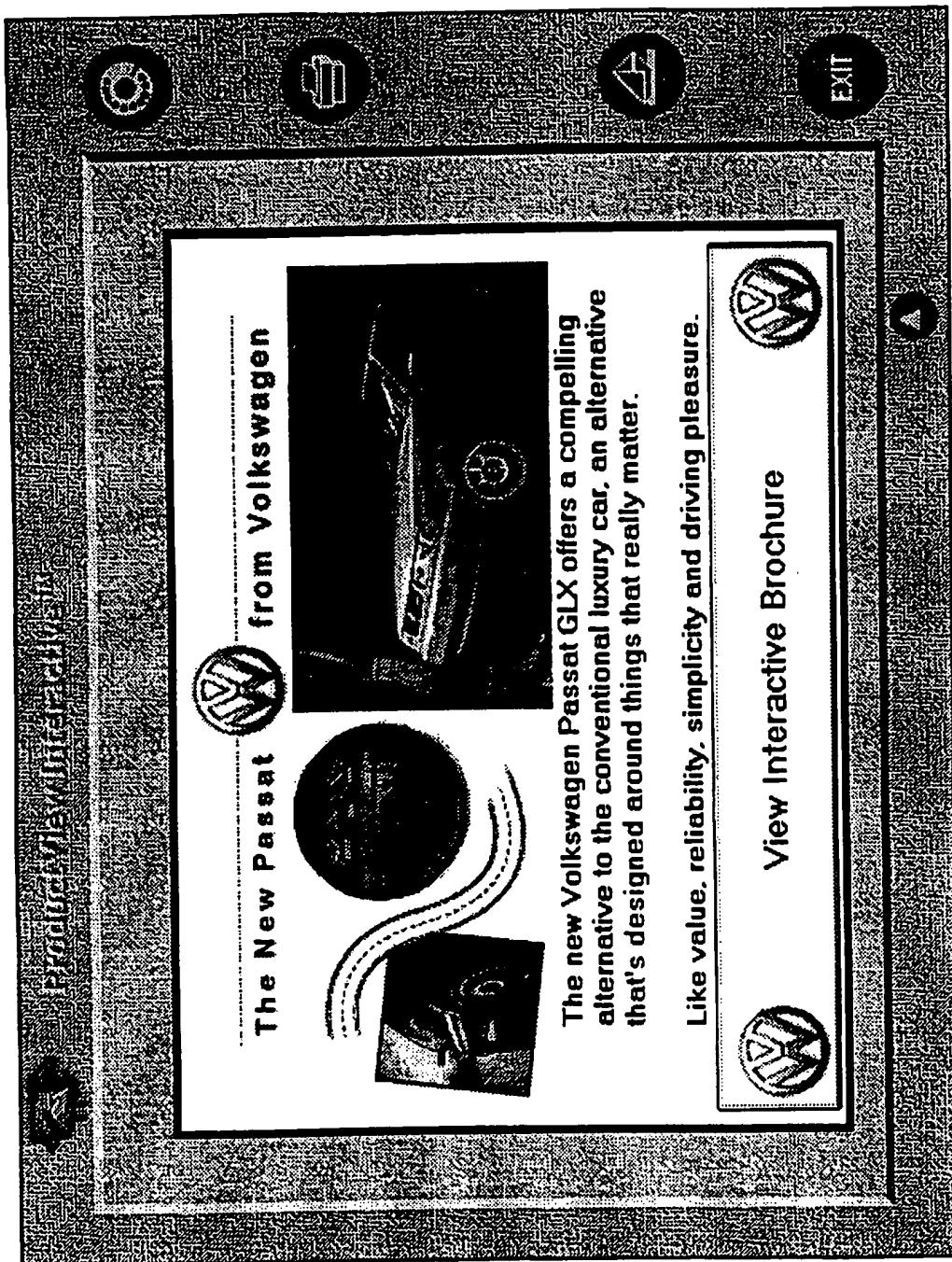


FIG. 3D

SUBSTITUTE SHEET (RULE 26)

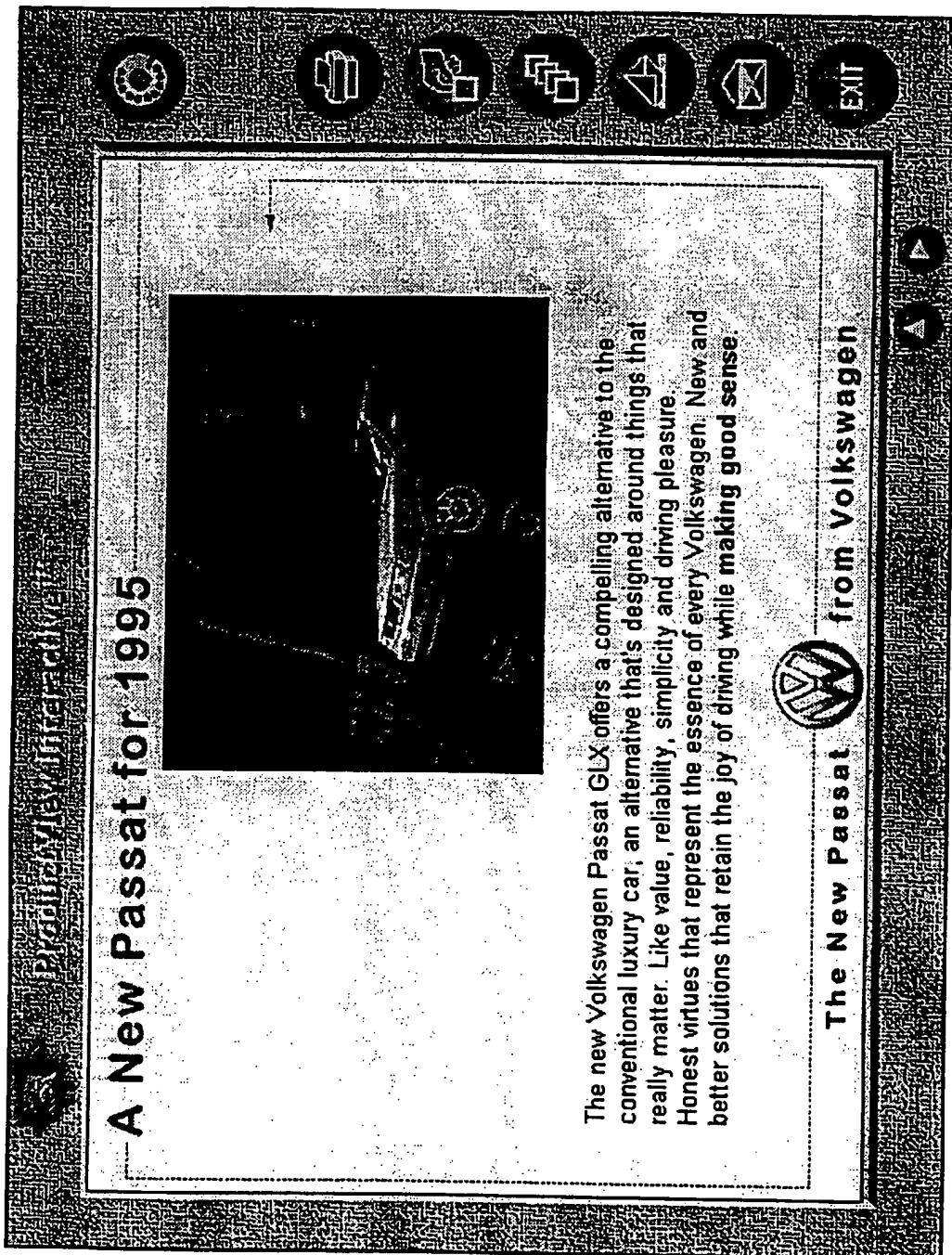
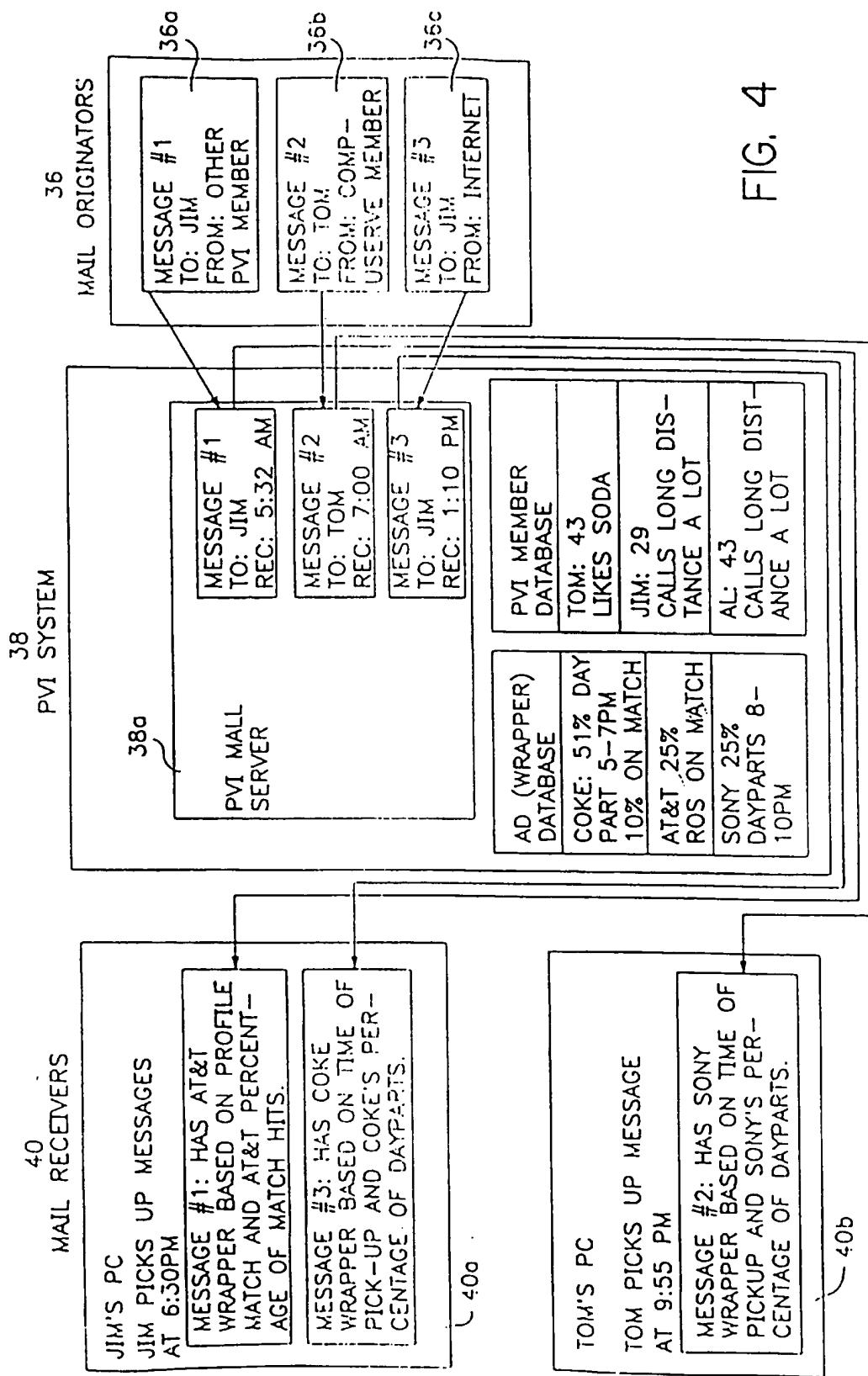


FIG. 3E

SUBSTITUTE SHEET (RULE 26)

8/12

**SUBSTITUTE SHEET (RULE 26)**

9/12

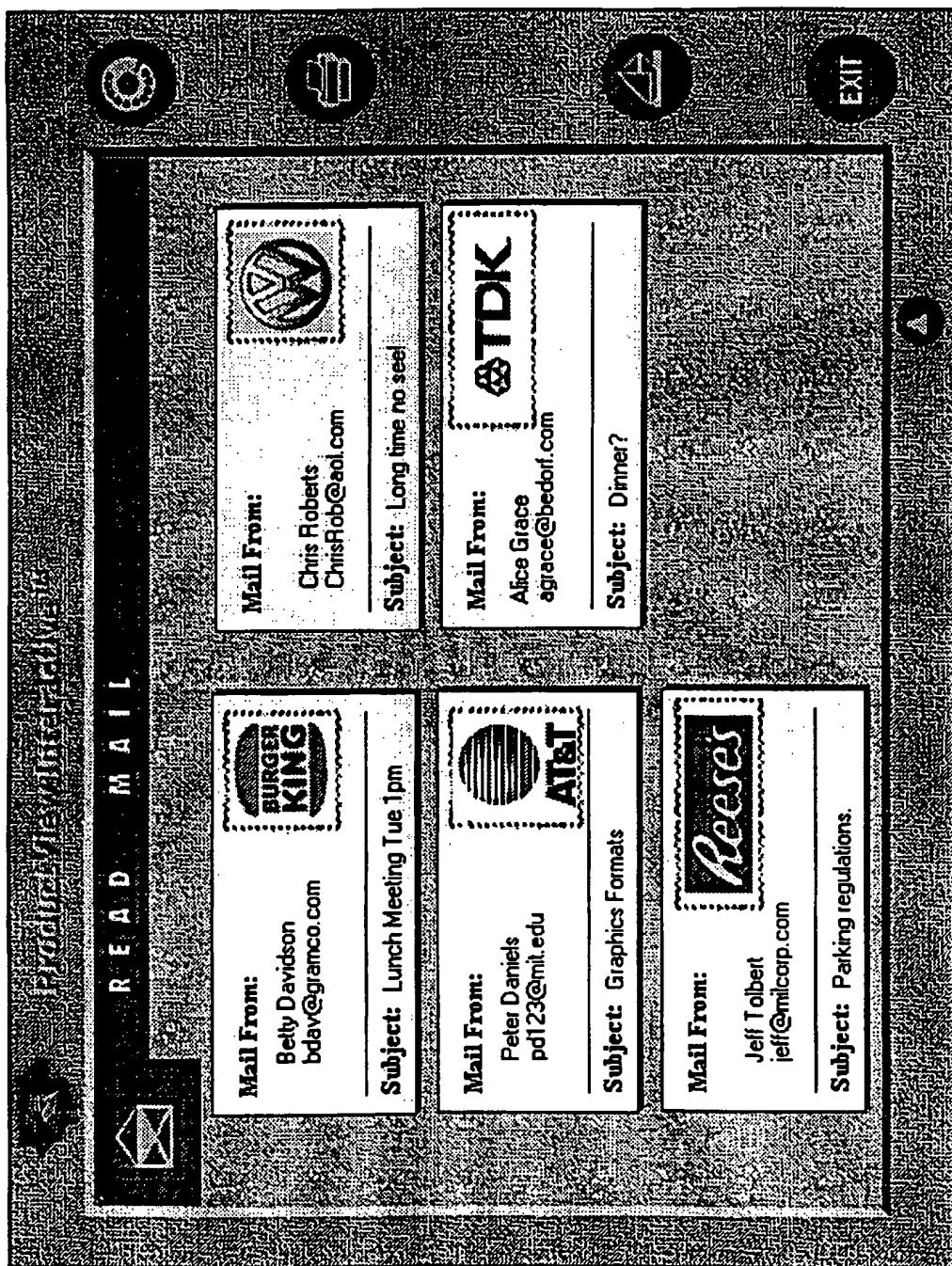


FIG. 5

SUBSTITUTE SHEET (RULE 26)

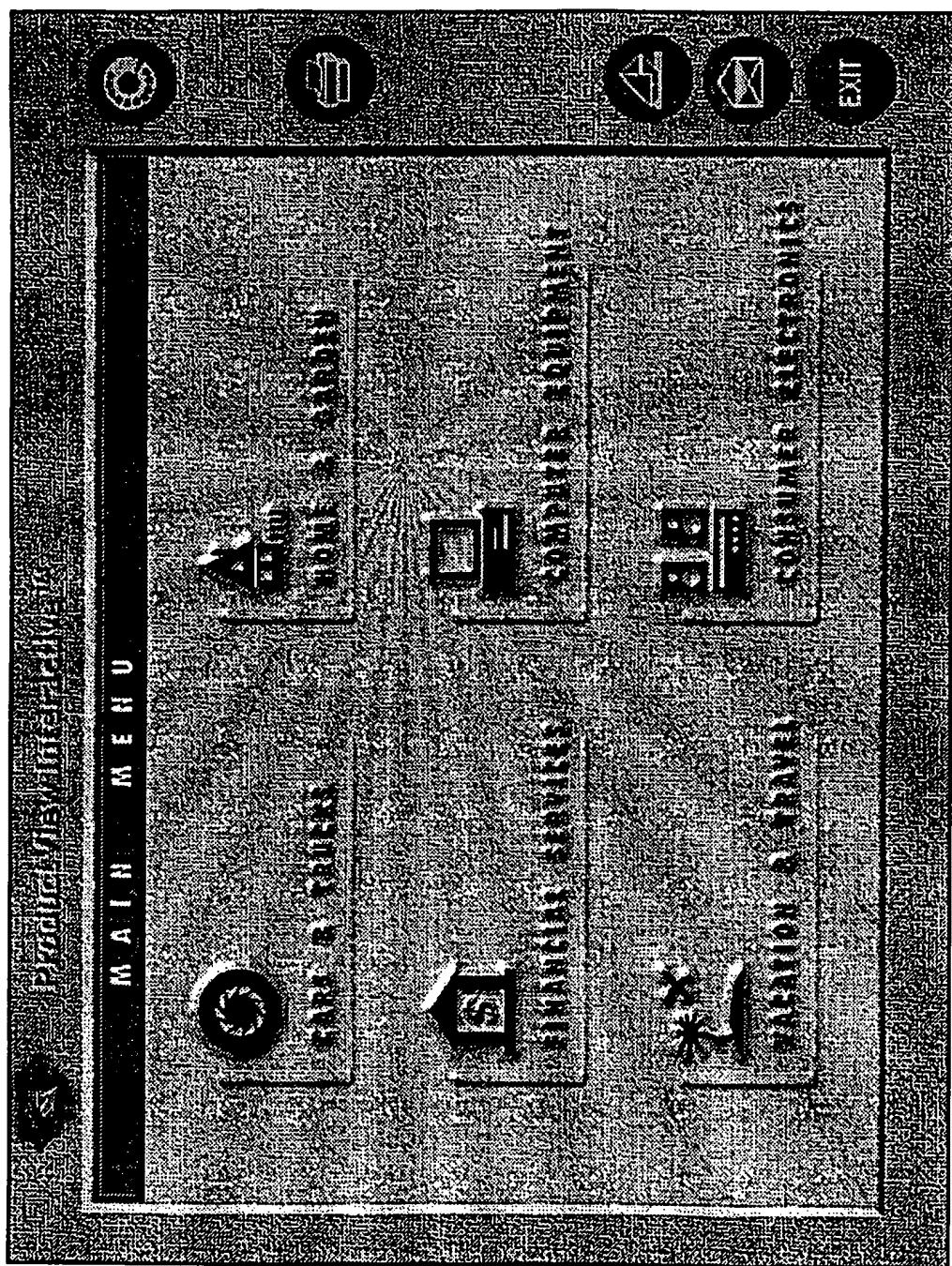


FIG. 6

**SUBSTITUTE SHEET (RULE 26)**

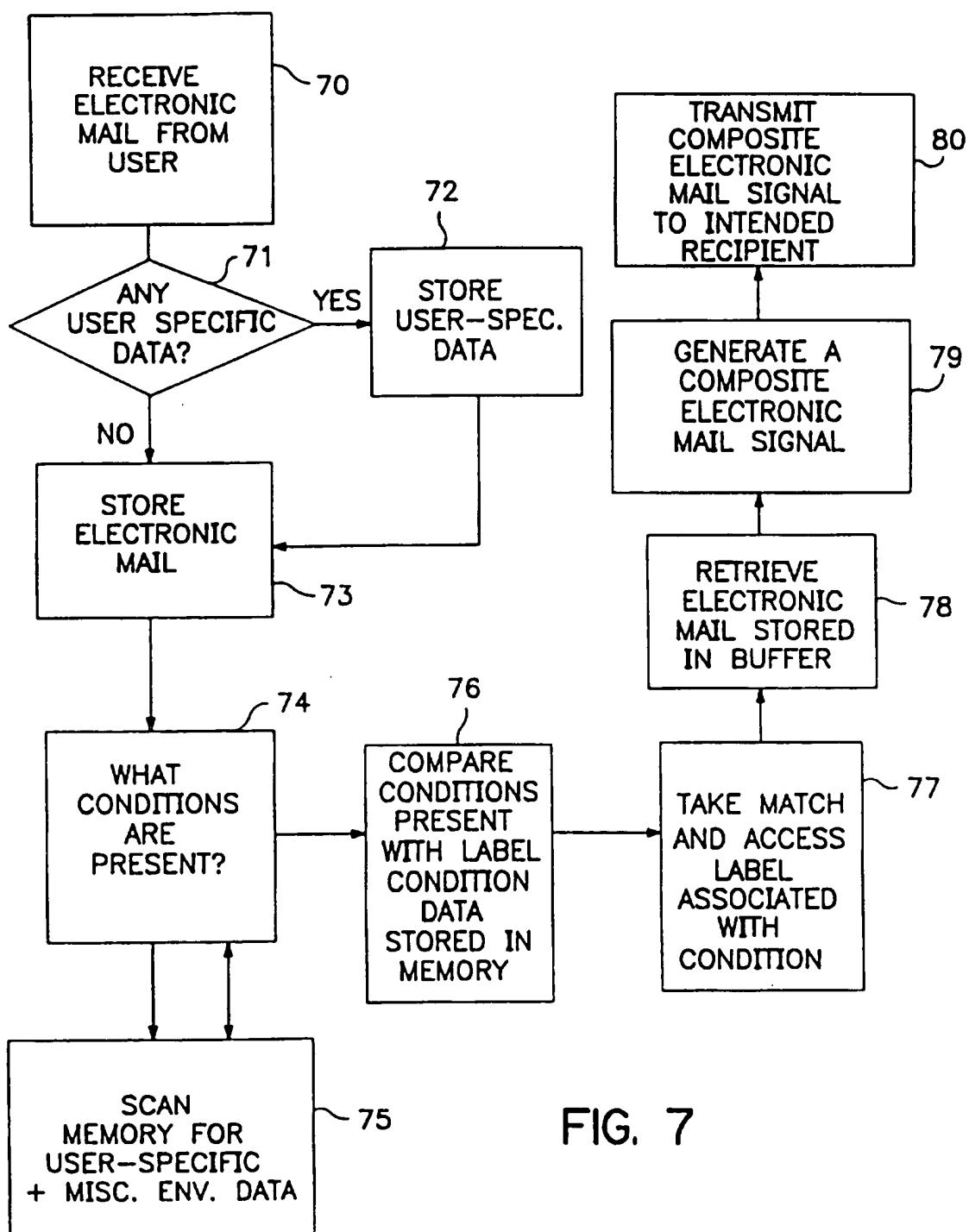


FIG. 7

SUBSTITUTE SHEET (RULE 26)

12/12

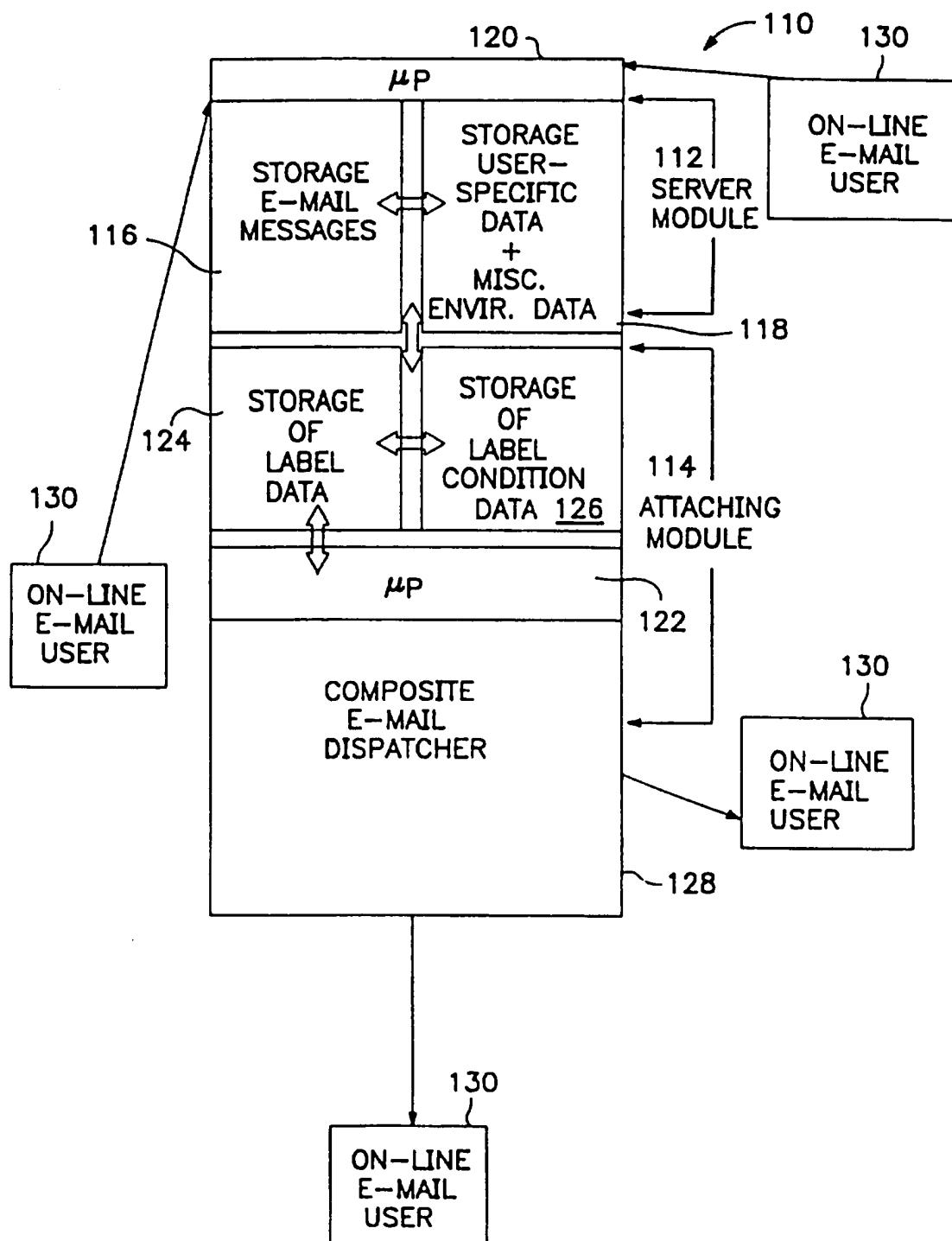


FIG. 8  
SUBSTITUTE SHEET (RULE 26)

# INTERNATIONAL SEARCH REPORT

International Application No  
PCT/US 96/00933

**A. CLASSIFICATION OF SUBJECT MATTER**  
IPC 6 H04L29/06 H04L12/58

According to International Patent Classification (IPC) or to both national classification and IPC

**B. FIELDS SEARCHED**

Minimum documentation searched (classification system followed by classification symbols)

IPC 6 H04L

Documentation searched other than minimum documentation to the extent that such documents are included in the fields searched

Electronic data base consulted during the international search (name of data base and, where practical, search terms used)

**C. DOCUMENTS CONSIDERED TO BE RELEVANT**

Category *	Citation of document, with indication, where appropriate, of the relevant passages	Relevant to claim No.
X	US,A,5 333 186 (S.K.GUPTA) 26 July 1994 see column 1, line 27 - line 47	1-3,6,7, 21,27,28
A	see column 2, line 36 - column 5, line 62 see figures 1-3 ---	8,22
X	US,A,4 850 007 (P.J.MARINO) 18 July 1989 see column 1, line 39 - column 2, line 41 see column 2, line 51 - column 5, line 44 see figures 1,2 -----	1-3,6,7, 21,27,28

Further documents are listed in the continuation of box C.

Patent family members are listed in annex.

\* Special categories of cited documents :

- \*A\* document defining the general state of the art which is not considered to be of particular relevance
- \*E\* earlier document but published on or after the international filing date
- \*L\* document which may throw doubts on priority claim(s) or which is cited to establish the publication date of another citation or other special reason (as specified)
- \*O\* document referring to an oral disclosure, use, exhibition or other means
- \*P\* document published prior to the international filing date but later than the priority date claimed

- \*T\* later document published after the international filing date or priority date and not in conflict with the application but cited to understand the principle or theory underlying the invention
- \*X\* document of particular relevance; the claimed invention cannot be considered novel or cannot be considered to involve an inventive step when the document is taken alone
- \*Y\* document of particular relevance; the claimed invention cannot be considered to involve an inventive step when the document is combined with one or more other such documents, such combination being obvious to a person skilled in the art.
- \*&\* document member of the same patent family

Date of the actual completion of the international search	Date of mailing of the international search report
30 May 1996	11.06.96
Name and mailing address of the ISA European Patent Office, P.B. 5818 Patentlaan 2 NL - 2280 HV Rijswijk Tel. (+ 31-70) 340-2040, Tx. 31 651 epo nl, Fax (+ 31-70) 340-3016	Authorized officer  Canosa Areste, C

Form PCT/ISA/210 (second sheet) (July 1992)

**INTERNATIONAL SEARCH REPORT**

Information on patent family members

International Application No

PCT/US 96/00933

Patent document cited in search report	Publication date	Patent family member(s)		Publication date
US-A-5333186	26-07-94	NONE		
US-A-4850007	18-07-89	AU-B-	607233	28-02-91
		AU-B-	1838588	05-01-89
		CA-A-	1286759	23-07-91
		GB-A,B	2206265	29-12-88
		JP-A-	1017553	20-01-89
		JP-C-	1764247	28-05-93
		JP-B-	4058221	16-09-92

Form PCT/ISA/310 (patent family annex) (July 1992)